

Applicant : Ludwig et al.
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Attorney's Docket No.: 02894-723US1 / 06768-PT22/rr

Amendments to the Drawings:

The attached replacement sheet of drawings includes changes to Fig. 1 and replaces the original sheet including Figs. 1 and 2.

In Figure 1, a turning device 30 has been added.

Attachments following last page of this Amendment:

Replacement Sheet (1 page)
Annotated Sheet Showing Change(s) (1 page)

REMARKS

In reply to the Office Action of September 6, 2007, Applicant submits the following remarks.

Drawings

The Examiner has requested that the Applicant furnish a drawing of the turning mechanism recited in Applicant's claims. Applicant respectfully submits that a drawing showing details of the turning mechanism is not necessary. The turning mechanism is conventional, and a detailed drawing is not essential for a proper understanding of the invention, and thus it is appropriate that the turning mechanism be shown in the form of a labeled representation (e.g., a labeled rectangular box). See 37 C.F.R. 1.83. Accordingly, Applicant has amended Fig. 1 to include such a labeled representation.

Rejection Under 35 U.S.C. 112, First Paragraph, Enablement

Claims 1-10, 12-14 and 22-23 have been rejected as failing to comply with the enablement requirement. The Examiner alleges that the specification (a) fails to enable one skilled in the art to make the invention(s) such that the workpiece(s) are oriented; and (b) fails to enable one skilled in the art to make the invention(s) such that the air flow created by the workpiece(s) is in a direction opposite to the conveyance direction. This rejection is respectfully traversed.

35 U.S.C. 112, first paragraph, requires applicants to provide a sufficient disclosure to enable one having ordinary skill in the relevant art to practice the claimed invention without the exercise of undue experimentation. See, e.g., *Ex parte Forman*, 230 USPQ 546, 547 (1986).

A person skilled in the art, reading Applicant's specification, would be able to practice the claimed invention -- a device for realizing a predetermined orientation of singularized work pieces being transported on a sliding surface -- without undue experimentation.

In *In re Wands* 858 F.3d 731 (Fed. Cir. 1998), the United States Court of Appeals for the Federal Circuit described the factors to be considered and balanced when determining whether a disclosure satisfies the enablement requirement. The Wands factors are discussed below.

The breadth of the claims:

The subject matter covered by the claims is no broader than Applicants' contribution.

The nature of the invention:

The invention generally relates to devices for orienting workpieces being transported on a sliding surface. The claimed devices include the combination of a first flow element, a second flow element and a guiding element, all of which are shown in Figure 1 and described in the specification. Applicant's invention is not the individual components of the device.

The state of the prior art:

No one has previously disclosed or suggested the devices covered by the pending claims.

The level of one of ordinary skill in the art:

In general, one of ordinary skill in the art would likely have an advanced degree in engineering or a related field, knowledge of aerodynamics, and possible additional experience in the area of conveyance and orientation of workpieces.

The level of predictability in the art:

The relevant art is generally predictable. The behavior of objects when subjected to a particular air flow profile can be predicted, e.g., using computer modeling, as can the air flow profile that will result from air passing through apertures of a particular size or configuration.

Guidance and working examples:

Applicant's disclosure does not include a working example. However, a particular embodiment of the device is described in detail and shown in Figure 1. While the specification does not give details of each and every element of the device, for example the mechanism used for adjusting the plates of the second flow element, these details would be well understood by those of ordinary skill in the art. Applicant's invention does not rest in these details.

Moreover, additional guidance is provided throughout the application as originally filed regarding orientation. For example, paragraphs [0007] and [0011] of the published application explain how, by varying and/or adapting the inclination of the air current, the properties of the work piece, for example the position of its center of gravity, can be utilized to orient the work piece.

The amount of experimentation required:

The fact that experimentation may be required, or even complex, does not necessarily make it undue, if the art typically engages in such experimentation. *See*, M.P.E.P §2164.01 citing *In re Certain Limited-Charge Cell Culture Microcarriers*, 221 USPQ 1165, 1174 (Int'l Trade Comm'n 1983), *aff'd. sub nom.* As discussed above, Applicants have disclosed the structure of a device that embodies the claimed invention and explained how the air flow generated by such a device can be used to orient work pieces. The details of how to adjust the air flow profile would differ from one type of work piece to another, depending, for example, on the geometry of the work piece. However, the flow profile needed for a particular type of work piece could be readily modeled or determined empirically based on the information provided by Applicant. Accordingly, the quantity of experimentation needed to make and use the invention is not undue.

With regard to whether causing the air flow created by the workpieces is in a direction opposite to the conveyance direction has been enabled, Applicant respectfully submits that this point is moot. This feature is not recited in any of Applicant's claims, and thus does not constitute the claimed invention.

Therefore, the Applicant has met the requirements of 35 U.S.C. 112, first paragraph, and Applicant respectfully requests that this rejection be withdrawn.

Rejection Under 35 U.S.C. 112, First Paragraph, "Best Mode"

The Examiner has rejected claims 1-10 and 12-14 under 35 U.S.C. 112, first paragraph, alleging that the best mode contemplated by the inventor has not been disclosed. The Examiner alleges that "evidence of concealment of the best mode is based upon the fact that the turning mechanism has not been depicted or elaborated upon."

This rejection is traversed. To determine whether the best mode requirement has been complied with, it is necessary to determine whether, at the time the application was filed, the inventor possessed a best mode for practicing the invention. MPEP 2165. There is no statutory requirement for the disclosure of a specific example -- a patent specification is not intended nor required to be a product specification. MPEP 2165.01. In this case, the inventors did not have any particular best mode in mind at the time the application was filed, believing instead that the turning mechanism could equally well be any one of the many conventional mechanisms for turning one plate relative to another. Accordingly, the best mode requirement has been complied with, despite the lack of detail furnished with regard to the turning mechanism. Applicant respectfully requests that this rejection be withdrawn.

Rejection Under 35 U.S.C. 112, Second Paragraph, Definiteness

Claims 1-10 and 22 -23 have been rejected as being indefinite. This rejection is respectfully traversed.

With regard to claims 1 and 22, the Examiner contends that it is unclear what the guiding element is. Applicant submits that it would be clear to the artisan that the guiding element referred to in the claim is the adjustable flow element that is discussed at paragraphs [0011] and [0023] of Applicant's published application.

With regard to claims 4-6, the Examiner contends that "there appear to be inconsistencies with the drawings." Applicant respectfully submits that these claims are definite, and are consistent with the specification. The relevant disclosure is found at paragraphs [0010] and [0023] of Applicant's published application, and in Fig. 1. It is clear, studying Fig. 1 with reference to the disclosure, that the flow element 16 (the guiding element in Applicant's claims)

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can define the sliding surface 2, or can be partially or completely covered by a perforated plate 17, which then defines the sliding surface 2 where it covers the flow element 16.

Conclusion

Applicant respectfully submits that all claims are in condition for allowance, which is respectfully requested. If the Examiner deems that the application is not in condition for allowance, the courtesy of a telephone interview with the undersigned is respectfully requested.

It is believed that no fees are due with this submission. Please apply any charges or credits to deposit account 06-1050.

Respectfully submitted,

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